

**Amendments to the Claims:**

This listing of claims will replace all prior versions, and listings, of claims in the application.

**Listing of Claims:**

Claim 1 (Currently amended): A method for determining mortality rate of an organism, said method comprising:

- a) determining telomere length of a somatic cell of said organism; and
- b) correlating said telomere length with mortality rate associated with somatic cell telomere length in an age-matched population of the organism.

Claim 2 (Original): The method according to claim 1, wherein in said organism is human.

Claim 3 (Original): The method according to claim 1, wherein telomere length is the average telomere length.

Claim 4 (Original): The method according to claim 3, wherein said average telomere length is determined by polymerase chain reaction.

Claim 5 (Original): The method according to claim 1, wherein said telomere length is determined from blood.

Claim 6 (Original): The method according to claim 1, wherein said telomere length is determined from lymphoid cells.

Claim 7 (Previously presented): The method according to claim 6, wherein said lymphoid cells comprise T cells.

Claim 8 (Canceled)

Claim 9 (Currently amended): The method according to claim [[8]] 2, wherein said aged matched population is within about 10 human years of the age of said ~~individual~~ organism.

Claim 10 (Currently amended): The method according [[too]] to claim 9, wherein said aged matched population is within about 5 human years of the age of said ~~individual~~ organism.

Claim 11 (Previously presented): The method according to claim 1 wherein said mortality rate is associated with infectious diseases.

Claim 12 (Previously presented): The method according to claim 1, wherein said mortality rate is associated with vascular disease.

Claim 13 (Currently amended): A method for determining mortality rate of an organism, said method comprising:

- a) determining the rate of telomere length decrease in a somatic cell of said organism; and
- b) correlating said rate of decrease with mortality rate associated with rate of telomere length decrease in the somatic cells of an age-matched population of the organism.